



**National Water Quality Monitoring Council**

Working together for clean water



Hugh Sullivan

# **INTERSTATE MONITORING ISSUES**

**NATIONAL MONITORING NETWORK**

**FOR**

**U.S. COASTAL WATERS AND THEIR TRIBUTARIES**





# National Monitoring Network

- Background
- Management Questions
- Design Features
- Plan Elements
- Regional Network Goals
- Benefits





# National Monitoring Network Background

- U.S. Commission on Ocean Policy recommended building the network
  - [An Ocean Blueprint for the 21st Century](#), Chapter 15
- National Ocean Policy Implementation Plan charged the NWQMC with implementing the NMN design.
- Original NMN Design directed the Network to address a variety of water quality issues.
  - Due to budgetary constraints, the NMN focus has been narrowed to addressing nutrient issues.





# Management Questions

- What is the condition of the Nation's coastal waters?
- Where, how and why are water quality conditions changing?
- Are protection strategies working?
- Are management strategies helping coastal water bodies to meet water quality goals and standards?





# NMN Design Features

- A Network of Networks linking inland, coastal and ocean monitoring data
  - Comparable and quality-controlled data across regions and resource compartments
  - Common data collection parameters and approaches
  - Includes data management and access
- Allows both fixed station and statistical designs
- Builds upon existing programs





# NMN Plan Elements

- Promote new sensor technologies
- Increase data accessibility
- Promote links between freshwater and coastal nutrient models
- How can the NMN design help to address water-quality issues in select estuaries?
  - Demonstration studies
    - San Francisco Bay
    - Delaware Estuary
    - Lake Michigan
    - Albemarle–Pamlico
    - Puget Sound



# NMNs Goals for Regional Networks

- Assess data gaps
  - How will they be addressed?
- Adopt data sharing standards to make data available through WQP
  - Water Quality eXchange (WQX)
    - Used by 400 federal, state, Tribal and other partners to share discrete water quality data
    - Enables participation on EPA/USGS Water Quality Portal
  - WaterML2 (under development)
    - International hydrological time-series data standard
    - Being explored as a potential tool for sharing real-time water quality monitoring data in the U.S.
- Share innovative monitoring tools





# Benefits of NMN Participation

- Connections to other water quality professionals
  - Helpful for learning how they address data gaps
- Assistance in meeting data sharing standards
- Central Point for access to data
  - WQX for discrete data now available
  - WaterML2 for access to continuous monitoring – under development







# National Monitoring Network Co-Chair

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